

NASA Case No. NPO-20148-2-CU
Attorney Docket No. JPL1-BF42a

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

In re Application of:

John D. Olivas

Serial No.:

Filed:

For: PROTECTIVE FULLERENE (C60)
PACKAGING SYSTEM FOR
MICROELECTROMECHANICAL
SYSTEMS APPLICATIONS

Previous Examiner:

Previous Group Art Unit:

June 7, 2001

Irvine, California 92614

PRELIMINARY AMENDMENT

Assistant Commissioner for Patents
Washington, D.C. 20231

Dear Sir:

Prior to an examination on the merits of the above-identified divisional application, it is requested that the following amendments be entered:

IN THE SPECIFICATION:

Page 1, (after the title) insert the following paragraph-- CROSS REFERENCE TO RELATED APPLICATION This is a divisional application of U.S. Serial No. 09/310,774 filed on May 3, 1999. --.

IN THE CLAIMS:

Please cancel Claims 1-5 without prejudice.

Please add the following newly drafted Claims 7-12:

1 7. A microelectromechanical system (MEMS) device including a diaphragm
2 comprising a conducting surface, the MEMS device further comprising exactly one layer
3 of C₆₀ fullerene on the conducting surface.

1 8. The MEMS device of claim 7, wherein the conducting surface includes gold.

1 9. The MEMS device of claim 8, where the C₆₀ fullerene is deposited on the gold
2 surface by sublimation.

1 10. The MEMS device of claim 8 where the C₆₀ fullerene is deposited on the gold
2 surface by chemisorbtion.

1 11. The MEMS device of claim 7 further comprising a single event pipe containing a
2 gas that reacts with carbon byproducts.

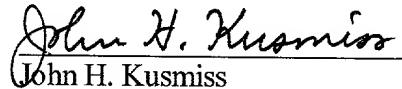
1 12. A mechanically adjustable electron tunneling tip system comprising:
2 a tunneling tip including a piezoelectric element connected to an end of the
3 tunneling tip;
4 a MEMS device including a conducting surface opposed the tunneling tip; and
5 a single layer of C₆₀ fullerene between the tunneling tip and the MEMS device
6 conducting surface.

REMARKS

This is a divisional application of U.S. Serial No. 09/310,774. It is requested that the references cited in the prosecution of the parent application be considered in the prosecution of this divisional application, and accordingly copies of the references cited in the parent application are attached hereto with a form PTO 1449. The relevance of those references was set forth in the prosecution of U.S. Serial No. 09/310,774.

If the Examiner believes that a telephone interview will help further the prosecution of this case, Applicants respectfully request that the undersigned attorney be contacted at the listed telephone number.

Respectfully submitted,


John H. Kusmiss

Attorney of Record, 32,149

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